## § 173.63

[Amdt. 173–260, 62 FR 24720, May 6, 1997; 62 FR 45702, Aug. 28, 1997; 62 FR 51560, Oct. 1, 1997; 63 FR 1884, Jan. 12, 1998; 63 FR 52849, Oct. 1, 1998; 64 FR 51918, Sept. 27, 1999; 65 FR 50461, Aug. 18, 2000; 65 FR 58629, Sept. 29, 2000; 65 FR 60383, Oct. 11, 2000; 66 FR 33429, 33430, June 21, 2001; 66 FR 45183, 45379, 45382, Aug. 28, 2001]

## §173.63 Packaging exceptions.

- (a) Cord, detonating (UN 0065), having an explosive content not exceeding 6.5 g (0.23 ounces) per 30 centimeter length (one linear foot) may be offered for transportation domestically and transported as Cord, detonating (UN 0289), Division 1.4 Compatibility Group D (1.4D) explosives, if the gross weight of all packages containing Cord, detonating (UN 0065), does not exceed 45 kg (99 pounds) per:
- (1) Transport vehicle, freight container, or cargo-only aircraft;
- (2) Off-shore down-hole tool pallet carried on an off-shore supply vessel;
- (3) Cargo compartment of a cargo vessel; or
- (4) Passenger-carrying aircraft used to transport personnel to remote work sites, such as offshore drilling units.
- (b) Cartridges, small arms, and cartridges power devices. (1) Cartridges, small arms, and cartridges power devices (which are used to project fastening devices) which have been classed as a Division 1.4S explosive may be reclassed, offered for transportation, and transported as ORM-D material when packaged in accordance with paragraph (b)(2) of this section: such transportation is excepted from the requirements of subparts E (Labeling) and F (Placarding) of part 172 of this subchapter. Cartridges, small arms, and cartridges power devices that may be shipped as ORM-D material is limited to:
- (i) Ammunition for rifle, pistol or shotgun:
- (ii) Ammunition with inert projectiles or blank ammunition:
- (iii) Ammunition having no tear gas, incendiary, or detonating explosive projectiles;
- (iv) Ammunition not exceeding 12.7 mm (50 caliber or 0.5 inch) for rifle or pistol, cartridges or 8 gauge for shotshells; and
- (v) Cartridges, power devices which are used to project fastening devices.

- (2) Packaging for cartridges, small arms, and cartridges power devices as ORM-D material must be as follows:
- (i) Ammunition must be packed in inside boxes, or in partitions which fit snugly in the outside packaging, or in metal clips;
- (ii) Primers must be protected from accidental initiation;
- (iii) Inside boxes, partitions or metal clips must be packed in securely-closed strong outside packagings;
- (iv) Maximum gross weight is limited to 30 kg (66 pounds) per package; and
- (v) Cartridges, power devices which are used to project fastening devices and 22 caliber rim-fire cartridges may be packaged loose in strong outside packagings.
  - (c)-(e) [Reserved]
- (f) Detonators containing no more than 1 g explosive (excluding ignition and delay charges) that are electric blasting caps with leg wires 4 feet long or longer, delay connectors in plastic sheaths, or blasting caps with empty plastic tubing 12 feet long or longer may be packed as follows in which case they are excepted from the packaging requirements of § 173.62:
- (1) No more than 50 detonators in one inner packaging:
- (2) IME Standard 22 container or compartment is used as the outer packaging;
- (3) No more than 1000 detonators in one outer packaging; and
- (4) No material may be loaded on top of the IME Standard 22 container and no material may be loaded against the outside door of the IME Standard 22 compartment.
- (g) Detonators that are classed as 1.4B or 1.4S and contain no more than 1 g of explosive (excluding ignition and delay charges) may be packed as follows in which case they are excepted from the packaging requirements of § 173.62:
- (1) No more than 50 detonators in one inner packaging;
- (2) IME Standard 22 container is used as the outer packaging;
- (3) No more than 1000 detonators in one outer packaging; and

(4) Each inner packaging is marked "1.4B Detonators" or "1.4S Detonators", as appropriate.

[Amdt. 173–224, 55 FR 52617, Dec. 21, 1990, as amended at 56 FR 66268, Dec. 20, 1991; Amdt. 173–236, 58 FR 50536, Sept. 24, 1993; Amdt. 173–253, 61 FR 27175, May 30, 1996]

## Subpart D—Definitions Classification, Packing Group Assignments and Exceptions for Hazardous Materials Other Than Class 1 and Class 7

SOURCE: Amdt. 173–224, 55 FR 52634 Dec. 21, 1990, unless otherwise noted.

## § 173.115 Class 2, Divisions 2.1, 2.2, and 2.3—Definitions.

- (a) Division 2.1 (Flammable gas). For the purpose of this subchapter, a flammable gas (Division 2.1) means any material which is a gas at 20 °C (68 °F) or less and 101.3 kPa (14.7 psia) of pressure (a material which has a boiling point of 20 °C (68 °F) or less at 101.3 kPa (14.7 psia)) which—
- (1) Is ignitable at 101.3 kPa (14.7 psia) when in a mixture of 13 percent or less by volume with air; or
- (2) Has a flammable range at 101.3 kPa (14.7 psia) with air of at least 12 percent regardless of the lower limit.
- Except for aerosols, the limits specified in paragraphs (a)(1) and (a)(2) of this section shall be determined at 101.3 kPa (14.7 psi) of pressure and a temperature of 20 °C (68 °F) in accordance with ASTM E681–85, Standard Test Method for Concentration Limits of Flammability of Chemicals or other equivalent method approved by the Associate Administrator. The flammability of aerosols is determined by the tests specified in §173.306(i) of this part.
- (b) Division 2.2 (non-flammable, nonpoisonous compressed gas—including compressed gas, liquefied gas, pressurized cryogenic gas, compressed gas in solution, asphyxiant gas and oxidizing gas). For the purpose of this subchapter, a nonflammable, nonpoisonous compressed gas (Division 2.2) means any material (or mixture) which—
- (1) Exerts in the packaging an absolute pressure of 280 kPa (40.6 psia) or greater at 20  $^{\circ}$ C (68  $^{\circ}$ F), and

- (2) Does not meet the definition of Division 2.1 or 2.3.
- (c) Division 2.3 (Gas poisonous by inhalation). For the purpose of this subchapter, a gas poisonous by inhalation (Division 2.3) means a material which is a gas at 20 °C (68 °F) or less and a pressure of 101.3 kPa (14.7 psia) (a material which has a boiling point of 20 °C (68 °F) or less at 101.3 kPa (14.7 psia)) and which—
- (1) Is known to be so toxic to humans as to pose a hazard to health during transportation, or
- (2) In the absence of adequate data on human toxicity, is presumed to be toxic to humans because when tested on laboratory animals it has an  $LC_{50}$  value of not more than 5000 mL/m³ (see §173.116(a) of this subpart for assignment of Hazard Zones A, B, C or D).  $LC_{50}$  values for mixtures may be determined using the formula in §173.133(b)(1)(i) of this subpart.
- (d) Non-liquefied compressed gas. A non-liquefied compressed gas means a gas, other than in solution, which in a packaging under the charged pressure is entirely gaseous at a temperature of 20 °C (68 °F).
- (e) Liquefied compressed gas. A lique-fied compressed gas means a gas which in a packaging under the charged pressure, is partially liquid at a temperature of 20  $^{\circ}$ C (68  $^{\circ}$ F).
- (f) Compressed gas in solution. A compressed gas in solution is a non-liquefied compressed gas which is dissolved in a solvent.
- (g) Cryogenic liquid. A cryogenic liquid means a refrigerated liquefied gas having a boiling point colder than  $-90\,^{\circ}\mathrm{C}$  ( $-130\,^{\circ}\mathrm{F})$  at  $101.3~\mathrm{kPa}$  (14.7 psia) absolute. A material meeting this definition is subject to requirements of this subchapter without regard to whether it meets the definition of a non-flammable, non-poisonous compressed gas in paragraph (b) of this section.
- (h) Flammable range. The term flammable range means the difference between the minimum and maximum volume percentages of the material in air that forms a flammable mixture.
- (i) Service pressure. The term service pressure means the authorized pressure marking on the packaging. For example, for a cylinder marked "DOT